

In the Claims:

1. (Currently amended) A fusion polypeptide which comprises an ~~AAV2~~ adeno-associated virus 2 (AAV2) Rep protein sequence of the left open reading frame of the rep gene that lacks a functional nuclear localization signal sequence and a polypeptide sequence that confers nuclear localization on said fusion polypeptide.
2. (Currently amended) A fusion polypeptide of claim 1, wherein said nuclear-localization-conferring polypeptide sequence is selected from the group consisting of Drosophila antennaepedia protein, ~~HIV-1~~ human immunodeficiency virus-1 (HIV-1) tat protein, ~~VP22~~ viral protein 22 (VP22), and functional fragments and variants thereof.
3. (Original) A fusion polypeptide of claim 1, wherein said nuclear-localization-conferring polypeptide sequence is selected from the group consisting of VP22 and functional fragments and variants thereof.
4. (Original) A fusion polypeptide of claim 1, wherein said Rep protein sequence contains a deletion mutation in the nuclear localization signal.
5. (Currently amended) A fusion polypeptide of claim 1, wherein said Rep protein sequence is ~~truncated to delete the carboxyl terminal amino acid residues of the Rep protein at amino acid residue 492~~ encoded by nucleotides 1883-3355 of SEQ ID NO:21.

6. (Currently amended) A fusion polypeptide of claim 1, wherein said Rep protein sequence is ~~truncated to delete the carboxyl terminal amino acid residues of the Rep protein at amino acid residue 491~~ encoded by nucleotides 1883-3352 of SEQ ID NO:21.

7. (Currently amended) A fusion polypeptide of claim 1, wherein said Rep protein sequence is ~~truncated to delete the carboxyl terminal amino acid residues of the Rep protein at amino acid residue 490~~ encoded by nucleotides 1883-3349 of SEQ ID NO:21.

8. (Currently amended) A fusion polypeptide of claim 1, wherein said Rep protein sequence is ~~truncated to delete the carboxyl terminal amino acid residues of the Rep protein at amino acid residue 489~~ encoded by nucleotides 1883-3346 of SEQ ID NO:21.

9. (Original) A fusion polypeptide of claim 1, wherein said Rep protein sequence is fused to the carboxyl terminus of said nuclear localization polypeptide sequence.

10. (Original) A fusion polypeptide of claim 1, wherein said Rep protein sequence is fused to the amino terminus of said nuclear localization polypeptide sequence.

11. (Currently amended) A fusion polypeptide of claim 1, which further comprises a spacer of ~~about~~ 4 to ~~about~~ 7 amino acid residues between said Rep protein sequence and said nuclear localization polypeptide sequence.

12. (Original) A DNA construct encoding the fusion polypeptide of claim 1.

13. (Previously presented) A DNA construct of claim 12 which further comprises a promoter.

14. (Currently amended) A method for mediating site-specific integration of a rep-deleted ~~rAAV vector to~~ recombinant adeno-associated virus (rAAV) vector into the genome of a cell which comprises transfecting said cell with a DNA construct of claim 13, expressing said DNA construct, and transfecting said cell with said rep-deleted recombinant adeno-associated virus (rAAV) vector.

15. (Cancel herein).

16. (Currently amended) A method for mediating site-specific integration of a rep-deleted ~~rAAV~~ recombinant adeno-associated virus vector to a cell which comprises ~~contacting said cell with a fusion polypeptide of claim 1 during transfection of~~ transfecting said cell with said rep-deleted rAAV vector, and during said transfecting, contacting said cell with a fusion polypeptide of claim 1.